

**Amendments to the Specification:**

At page 1, line 3, please replace the title with --ETHANOL PRODUCTION IN RECOMBINANT HOSTS--

At page 1, after the title and indication of research support, please replace the paragraph following the title "Cross-Reference to Related Applications" with the following paragraph:

--This application is a continuation of Serial No. 09/290,463, filed on April 12, 1999, Abandoned, which is a continuation of Serial No. 008/475,925, filed on June 7, 1995 (now U.S. Patent No. 5,916,787), which in turn is a continuation of Serial No. 08/220,072, filed on March 30, 1994 (now U.S. Patent No. 5,482,846), which is a continuation-in-part of Serial No. 08/026,051, filed on March 5, 1993 (now U.S. Patent No. 5,554,520), which is a continuation-in-part of Serial No. 07/946,290, filed September 17, 1992 (now U.S. Patent No. 5,487,989), which is a continuation-in-part of Serial No. 07/846,344, filed March 6, 1992 (now U.S. Patent No. 5,424,202), which is a continuation-in-part of Serial No. 07/670,821, filed March 18, 1991, Abandoned, and of Serial No. 07/624,227, filed December 7, 1990 (now abandoned), both of which are continuations-in-part of Serial No. 07/352,062, filed May 15, 1989 (now U.S. Patent No. 5,000,000); itself a continuation-in-part of Serial No. 07/239,099, filed August 31, 1988, Abandoned. The entire contents of aforementioned applications are incorporated herein by reference.--

**Listing of Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) A [Gram-positive bacterium] eukaryotic cell which has been transformed with heterologous genes encoding alcohol dehydrogenase and pyruvate decarboxylase wherein said genes are expressed at sufficient levels to confer upon said [Gram-positive bacterium] cell transformant the ability to produce ethanol as a fermentation product.
2. (Currently Amended) The [Gram-positive bacterium,] eukaryotic cell according to claim 1, wherein said [host] cell is selected from the group consisting of [*Bacillus*, *Lactobacillus*,